

Department of Environmental Quality

To protect, conserve and enhance the quality of Wyoming's environment for the benefit of current and future generations.





Todd Parfitt, Director

March 31, 2016

Mr. Charles Cornell Sr. Regulatory Lead Jonah Energy LLC 707 17th Street, Suite 2700 Denver, CO 80202

Permit No. P0020602

Dear Mr. Cornell:

The Division of Air Quality of the Wyoming Department of Environmental Quality has completed final review of Jonah Energy LLC's application to modify the drill rig fleet located in the Jonah and Pinedale Anticline Development Area (JPDA) in Sublette County, Wyoming. The current drill rig fleet is authorized under CT-8122A3 to operate with a total actual annual NO_x emissions from all drill rig engines and boilers associated with the Jonah Energy LLC Drill Rig Fleet of 282.0 tons per year (tpy). Jonah Energy LLC is requesting to modify the drill rig fleet to 200.0 tpy total actual annual NO_x emissions from all drill rig engines and boilers associated with the Jonah Energy LLC Drill Rig Fleet.

Following this agency's proposed approval of the request as published February 19, 2016, and in accordance with Chapter 6, Section 2(m) of the Wyoming Air Quality Standards and Regulations, the public was afforded a thirty (30) day period in which to submit comments concerning the proposed modification, and an opportunity for a public hearing. No comments have been received. Therefore, on the basis of the information provided to us, approval to modify the Drill Rig Fleet as described in the application is hereby granted pursuant to Chapter 6, Section 2 of the regulations with the following conditions:

- 1. That authorized representatives of the Division of Air Quality be given permission to enter and inspect any property, premise or place on or at which an air pollution source is located or is being constructed or installed for the purpose of investigating actual or potential sources of air pollution and for determining compliance or non-compliance with any rules, standards, permits or orders.
- 2. That all substantive commitments and descriptions set forth in the application for this permit, unless superseded by a specific condition of this permit, are incorporated herein by this reference and are enforceable as conditions of this permit.
- 3. That all notifications, reports and correspondences associated with this permit shall be submitted to the Stationary Source Compliance Program Manager. Submissions may be done electronically through https://airimpact.wyo.gov to satisfy requirements of this permit.
- 4. This permit only applies to the Jonah Energy LLC Drill Rig Fleet while operating in the Jonah and Pinedale Anticline Development Area (JPDA) and Normally Pressurized Lance (NPL). The permit conditions contained herein are only enforceable while operating drill rigs in the JPDA and NPL.
 - The JPDA and NPL area consists of 109W & R110W in T34N, R109W & R110W in T33N, R108W, R109W & R110W in T32N, R108W, R109W & R110W in T31N, R107W, R108W & R109W in T30N, R107W, R108W, R109W, & R110W in T29N, R107W, R108W, R109W, & R110W in T28N, and R107W, R108W & R109W in T27N.

- 5. That written notification of the actual date of initial start-up for each drill rig/engine/boiler is required fifteen (15) days after start-up as defined in Condition 9. Such notification shall be submitted on a complete AQD-RIG Installation/Removal form. The form can be downloaded from the Air Quality website http://deq.wyoming.gov/agd or obtained from the Air Quality Division.
- 6. That upon removal of a drill rig/engine/boiler from the JPDA/NPL, written notification is required within fifteen (15) days of removal. Such notification shall be submitted on a complete AQD-RIG Installation/Removal form.
- 7. That emissions shall be limited as follows:
 - i. Total actual annual NO_x emissions from all drill rig engines and boilers associated with the Jonah Energy LLC Drill Rig Fleet shall not exceed 200.0 tons per year (tpy) NO_x.
 - ii. Emissions from the natural gas fired drill rig engines in the Jonah Energy LLC Drill Rig Fleet shall not exceed the values in the following table.

	g/hp-hr		Formaldehyde g/hp-hr
Natural Gas Engines	1.49	0.5	0.07

- 1. Lean burn engines shall be equipped with oxidation catalyst.
- 2. Rich burn engines shall be equipped with NSCR and an AFRC.
- iii. Total actual annual NO_x emissions from engines on any diesel fired drill rig in the Jonah Energy LLC Drill Rig Fleet shall not exceed 10 tpy per drill rig.
 - 1. Drill rig engines equipped with SCR shall have a minimum NO_x control efficiency of ninety percent (90%).
- 8. Ammonia slip from each SCR air pollution control system shall not exceed 10 ppm_v at fifteen percent (15%) O₂ as measured by initial and periodic testing.
- 9. Jonah Energy LLC shall conduct an initial performance test for each drill rig engine no later than ninety (90) days after start-up. Startup shall be defined as follows:
 - i. For drill rig engines in service when CT-8122 was issued, the start-up date shall be January 4, 2010.
 - ii. For all other drill rig engines, the start-up date shall be the date the rig commences drilling at the first well.

- 10. Initial performance testing as required by Condition 9 of this permit shall be conducted on the drill rig engines as follows:
 - i. Natural gas fired engines

NO_x and CO Emissions: Testing for NO_x and CO emissions shall consist of three (3) 1-hour tests following EPA approved reference methods or the State of Wyoming's Portable Analyzer protocol to determine compliance with the g/hp-hr limits. Results shall be reported in terms of g/hp-hr. Emissions shall be calculated using the following equations:

g/hp - hr
$$NO_X$$
 = (ppm $NO_{X \text{ corrected}}$)(1.19x10⁻⁷)(F_factor)($\frac{20.9}{20.9 - O_2\%_{\text{corrected}}}$)

(Brake Specific Fuel Consumption(Btu / hp - hr))(10⁻⁶)(454)

g/hp - hr CO =
$$(ppm\ CO_{corrected})(7.27x\ 10^{-8})(F\ factor)(\frac{20.9}{20.9 - O_2\%_{corrected}})$$
(Brake Specific Fuel Consumption(Btu / hp - hr))(10⁻⁶)(454)

<u>VOC Emissions</u>: Testing for VOCs shall be conducted in accordance with a Division approved test method for one (1) engine of each engine type in the fleet.

Formaldehyde Emissions (Lean Burn Engines Only): Each engine shall be tested for formaldehyde. Testing shall consist of three (3) 1-hour tests following EPA approved reference methods or a Division approved formaldehyde test method. Emissions shall be calculated using the following equation:

g/hp - hr HCHO = (ppm HCHO_{corrected})(7.79
$$\times$$
10⁻⁸)(F _ factor)($\frac{20.9}{20.9 - O_2\%_{corrected}}$)
(Brake Specific Fuel Consumption(Btu / hp - hr))(10⁻⁶)(454)

ii. For diesel-fired drill rig engines equipped with SCR

NO_x Emissions: Compliance testing for NO_x shall be conducted in accordance with EPA approved reference methods or the State of Wyoming's Portable Analyzer Protocol. Testing shall consist of three (3) runs conducted at the inlet and outlet of the SCR system to determine the NO_x control efficiency. Results shall be reported in terms of percent control efficiency and g/hp-hr. Emissions shall be calculated using the following equation:

g/hp - hr
$$NO_X$$
 = (ppm $NO_{X_{corrected}}$)(1.19x 10^{-7})(F $_{-}$ factor)($\frac{20.9}{20.9 - O_2\%_{corrected}}$)

(Brake Specific Fuel Consumption(Btu / hp - hr))(10^{-6})(454)

CO Emissions: Testing for CO shall be conducted in accordance with EPA approved reference methods or the State of Wyoming's Portable Analyzer protocol. Results shall be submitted in terms of g/hp-hr. Brake Specific Fuel Consumption (BSFC) shall be provided in the report.

g/hp - hr CO = (ppm
$$CO_{corrected}$$
)(7.27x 10^{-8})(F $_{-}$ factor)($\frac{20.9}{20.9 - O2\%_{corrected}}$)
(Brake Specific Fuel Consumption(Btu / hp - hr))(10^{-6})(454)

<u>VOC Emissions</u>: Compliance testing for VOCs shall be conducted in accordance with a Division approved test method for one (1) engine of each engine type in the fleet.

<u>Ammonia Slip</u>: Compliance testing for ammonia slip shall be conducted using Draeger-Tube detectors or other methods as approved by the Administrator.

<u>Formaldehyde Emissions</u>: Testing for formaldehyde shall be conducted in accordance with a Division approved test method for one (1) engine of each engine type in the fleet.

Urea flow (gph and /or liters per hour), engine load (%) and/or boost pressure (psi), and catalyst inlet temperature (°F and/or °C) shall be recorded during each run and submitted with the test report. Brake specific fuel consumption (BSFC) shall be reported with the results for the initial performance test.

A test protocol shall be submitted for review and approval prior to testing. Notification of the test date shall be provided to the Division fifteen (15) days prior to testing. Results shall be submitted to the Division within forty-five (45) days of completion. Engine load (%) and brake specific fuel consumption (BSFC) shall be provided in the report.

- 11. That Jonah Energy LLC shall follow the testing requirements as follows for each drill rig engine:
 - i. For natural gas engines, each drill rig engine shall be tested semi-annually. The first semi-annual test is required six (6) months after completion of the initial performance tests required under Condition 9. Testing for NO_x and CO shall be conducted in accordance with EPA approved reference methods or the State of Wyoming's Portable Analyzer protocol. Compliance with the CO limits is considered verification that the VOC and formaldehyde emissions for the lean burn engines are controlled. Emissions shall be calculated using the equations listed in Condition 10.
 - ii. For drill rig engines equipped with SCR, each drill rig engine shall be tested quarterly. The first quarterly test is required the following calendar quarter after completion of the initial performance tests specified under Condition 10.
 - 1. Testing for NO_x shall be conducted in accordance with EPA approved reference methods or the State of Wyoming's Portable Analyzer protocol. Testing shall consist of one (1) ten (10) minute run conducted at the inlet and outlet of the SCR system to determine the NO_x control efficiency. Results shall be submitted in terms of percent control efficiency and g/hp-hr. Brake Specific Fuel Consumption (BSFC) shall be provided in the report. Emissions shall be calculated using the equation listed in Condition 10.
 - Testing for ammonia slip shall be conducted using Draeger-Tube detectors or other methods as approved by the Administrator.
 - 3. Urea flow (gph and /or liters per hour), engine load (%) and/or boost pressure (psi), and catalyst inlet temperature (°F and/or °C) shall be recorded during each run and submitted with the test report.
 - iii. A test protocol shall be submitted for review and approval prior to testing. Notification of the test date shall be provided to the Division fifteen (15) days prior to the testing. Results shall be submitted to the Division with forty-five (45) days of completing the tests. The engine load (%) and brake specific fuel consumption (BSFC) shall be provided in the report.
 - iv. The Air Quality Division shall be notified within twenty-four (24) hours of the testing/monitoring required by this condition that shows operation outside the permitted emission limits. By no later than seven (7) calendar days of such testing/monitoring event, the owner or operator shall repair and retest/monitor the affected engine to demonstrate that the engine has been returned to operation within the permitted emission limits. Compliance with this permit condition regarding repair and retesting/monitoring shall not be deemed to limit the authority of the Air Quality Division to cite the owner or operator for an exceedance of the permitted emission limits for any testing/monitoring required by this condition which shows noncompliance.

- 12. That Jonah Energy LLC shall follow the monitoring and maintenance requirements as follows:
 - i. For natural gas-fired engines equipped with an oxidation catalyst or NSCR catalyst, operate and maintain the engine, air pollution control equipment, and monitoring equipment according to good air pollution control practices at all times, including startup, shutdown, and malfunction.
 - ii. For diesel-fired engines equipped with an SCR catalyst, operate and maintain the engine, SCR system and monitoring equipment according to good air pollution control practices at all times, including startup, shutdown, and malfunction. The SCR system shall be operated at all times the drill rig is operating in the JPDA or NPL, except when the engine catalyst inlet temperature is less than 500°F. Records shall be kept to document periods when the SCR system is not operating and the engine is operating. The records shall include date, duration and cause.
 - iii. Operate the SCR Emission Control System in accordance with the manufacturer's recommendations which includes visually inspecting the catalysts and cleaning as necessary. Records shall be maintained of catalyst maintenance and replacement. Upon replacement of the catalyst, performance tests as specified by Condition 10 shall be conducted.
 - iv. For drill rigs in use equipped with a SCR system, records of urea flow (gph and /or liters per hour), engine load (%) and/or boost pressure (psi), and catalyst inlet temperature (°F and/or °C) shall be recorded, at minimum, daily when the engine is operating. Records of interim spot checks conducted to verify catalyst condition and any maintenance or corrective actions shall be kept for a period of at least five (5) years and shall be made available to the Division upon request.
 - v. All drill rigs in use equipped with a SCR system shall be equipped with a datalogger to record urea flow (gph and /or liters per hour), engine load (%) and/or boost pressure (psi), and catalyst inlet temperature (°F and/or °C). Upon startup, new drill rig engines equipped with SCR require a datalogger. Data shall be recorded on an interval of fifteen (15) minutes or less. Records shall be kept for a period of at least five (5) years and shall be made available to the Division upon request.

Jonah Energy LLC Air Quality Permit P0020602 Page 7

- 13. Jonah Energy LLC shall keep records of the following for each well drilled.
 - i. Drill Rig ID
 - ii. Well API number
 - iii. Well name
 - iv. Well location (longitude, latitude, elevation)
 - v. Drilling start and end dates
 - vi. Field name
 - vii. Equipment description, controls, and site rating
 - viii. Brake specific fuel consumption (BSFC)
 - ix. Total fuel usage for drill rig engines and boilers recorded on a daily basis
 - x. Heat content and sulfur content of fuel burned recorded from supplier certification
 - xi. Actual emissions for NO_x, CO, VOC, SO₂, PM₁₀, ammonia, and formaldehyde
 - 1. For engines, emissions shall be based on fuel consumption, g/hp-hr emission rates, and BSFC. Information recorded in Condition 12 regarding catalyst operation shall also be utilized to calculate emissions from the engines.
 - 2. For boilers, emissions shall be based on fuel consumption, lb/MMBtu rates or AP-42 factors converted to lb/MMBtu, and BSFC

The format presented in Appendix A shall be utilized to satisfy reporting requirements for the Division's annual emission inventory, which shall be submitted by March 31 of the following calendar year.

- 14. That drill rigs, boilers or engines that are subject to the conditions of this permit may be replaced without modifying this permit. Jonah Energy LLC shall provide notifications as required by Conditions 5 and 6 of this permit. The replacement drill rig/engine(s)/boiler(s) shall comply with the conditions of this permit.
- 15. All records required under this permit shall be kept for a period of at least five (5) years and shall be made available to the Division upon request.
- 16. That should drill rig engine(s) meet the definition of a stationary source, Jonah Energy LLC shall comply with all state and federal regulations applicable for stationary sources.
- 17. Jonah Energy LLC shall comply with all local, state, and federal rules and regulations applicable to the Drill Rig Fleet.
- 18. Effective upon permit issuance, this permit shall supersede Air Quality Permit CT-8122A3 for the Drill Rig Fleet.

It must be noted that this approval does not relieve you of your obligation to comply with all applicable county, state, and federal standards, regulations or ordinances. Special attention must be given to Chapter 6, Section 2 of the Wyoming Air Quality Standards and Regulations. Any appeal of this permit as a final action of the Department must be made to the Environmental Quality Council within sixty (60) days of permit issuance per Section 16, Chapter I, General Rules of Practice and Procedure, Department of Environmental Quality.

Jonah Energy LLC Air Quality Permit P0020602 Page 8

If we may be of further assistance to you, please feel free to contact this office.

Sincerely,

Nancy E. Vehi Administrator

Air Quality Division

Todd Parfitt

Director

Dept. of Environmental Quality.

Appendix ADrill Rig Emission Reporting Form

Drill Rig Emissions - 2009 Diesel Fuel Consumption (Sample data entries provided below for January through December 2009)

		2009 Drill	l Rig Olese	l Fuel Con	sumption					
	Rig #1 (gallons)	Rig #2 (gallons)	Rig #3 (gallons)	Rig #4 (gallons)	Rig #5 (gallons)	Rig #6 (gallons)	Rig	Wells	Jan	Totals
али агу 1	1,600	1,850	1,572	1,800		1,755	Rig #1		(gallons) 41,995	(gallons 41,995
2	1,700 1,500	2,054 1,848	2,390 1,572	1,800 1,800	1,380 2,070	1,990 1,726		MARK	*	41,99
4 5	1,500 1,600	1,221 1,848	1,889 1,753	1,440	1,380 2,300	1,274 1,345	Rig #2	Well #3	19,696 37,138	19,696 37,13
6	1,000	2,054	1,591	1,620	1,840	978		Well #5	31,130	
7 8	600 1,000	1,848 2,054	1,591 1,462	1,620 1,400	1,870 1,840	1,704	Rig #3	Well #6	31,060	\$6,83 31,060
9 10	1,200 1,200	811 1,848	1,809 1,572	1,620 1,620	1,610 1,840	2.45		Well #8	19,579	19,576
11 12	1,500	1,233 1,027	1,594	1,440	1,610 1,840	1761	Rig #4	Well#9	42,580	50,635 42,588
13 14	1,300 1,300	1,077	1,897 2,341	1,800 1,700	1,840	1000		Wel #11	8,520	8,620
15 16	1,122 1,496	1844	1,992 1,580	1,440 1,800	1 G10 1 64 6	1,000	Rìg #5	Well #12	23,490	51,200 23,490
17	1,122	1,641	1,343	1,620	1,000	1,623	≀ug #≎	With \$13	33,510	33,510
18 19	1,122 855	100	1,134 776	1,080 2,340	1816	100		Well #14		57,000
20 21	1,496 1,870	168	1,691	1,860 2,180	1,840	1.06	Rig #6	Well #15	9,068 38,110	9,068 38,110
22 23	1,663 1,496	2,052	1868	1,980 1,580	1 020 1 020	1.484 1.747		Well #17	-	
24 25	2,203 1,309	100	1021	1,620 1,280	1,543	1201		parmanaman		47,178
26 27	1,496 1,309	20197	1001	900	1,590	874				
28	1,309	200	1,000	1,540	1,640	760				
29 30	1,309 1,309		1019	1,940	100	760 765				
31	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)	(gallons)				
ubtotal	41,995	56,834	50,639	51,200	57,000	47,178				
den er Kristotieke	Rig #1	Rig #2	Rig #3	Filg #4	Rig #5	Rig #8				
ebruary	(enoilep)	(galions)	(gal(ons)	(gallens)	(gallons)	(gallons)	Rig	Wells	<u>feb</u> (galions)	<u>Totals</u> (gallons)
1 2	1,600 1,700	1,850 2,054	1,572 2,390	1,800	2,070 1,380	1,755 1,990	Rig #1	Well #1	38,068	38,968
3 4	1,500 1,500	1,848 1,221	1,572 1,889	1,800 1,440	2,070 1,380	1,726 1,274	Rig #2	Well #3	19,696	38,068 19,696
5	1,600	1,848	1,753	1,800	2,300 1,640	1,345 978	(tig #z	Well #5	30,976	30,976
6 7	1,000 600	2,054 1,848	1,591 1,591	1,620 1,620	1,870		PV - 445			50,672
8 9	1,000 1,200	2,054 811	1,462 1,809	1,400 1,620	1,840 1,610	1,794	Rig #3	Well #6	31,060 14,755	31,960 14,756
10 11	1,200 1,500	1,848 1,233	1,572 1,594	1,620 1,440	1,840 1,610	1,761		Well #8	*	45,815
12 13	1,200 1,300	1,027	1,978 1,897	1,440 1,800	1,840 1,840		Rig #4	Well #9	42,580 2,680	42,580 2,680
14 15	1,300 1,122	1,007	2,341 1,992	1,700		194		Well#11		45,260
16	1,496	1,019	1,580	1,800	1,000	1041	Rig #5	Well #12	23,490 27,990	23,490 27,990
17 18	1,122 1,122	100	1,343 1,134	1,620 1,080	10.0	1774		Wal 814	21,000	
19 20	855 1,496	1,000	167	2,340 1,860	2574		Rig #6	Well #15	9,068	51,480 9,086
21 22	1,870 1,663	104	1791	2,180 1,980		1.701 1.104		Well #17	35,803	35,803
23 24	1,496 2,203	2165	2.117 1.001	1,580 1,620	1070	1,747		WATE		44,87
25	1,309		100	1,280 900	2,560	193				<u> </u>
26 27	1,496 1,309	1901	100	/44	1774	430				
28	1,309		(gallons)	(gallons)	(gallons)	(gallons)				
	(gallons)	(gallons)			AND MAKE	44,871				
ublotal	(gallons) 38,068	(gallons) 50,672	45,815	45,260	51,480			C.C	vosas vosas.	engelse Zurburge engelst været
ublotal	38,068 Rig #1	50,672 Rig #2	45,815 Rig #3	Rig #4	51,480 Rig #5	Rög #6	Pia	Walte	No	Totale
sublotal Aarch	38,068 Rig #1 (gatjons)	50,672	45,815 Rig #3	Rig #4	51,480 Rig #5	Rig #6 (gallens)	Rig	Wells	(dajjous) Mat	Totals (gallons
tarch	38,068 Rig #1	50,672 Rig #2	45,815 Rig #3	Rig #4	51,480 Rig #5	Rig #6 (gallons) 781 1,587	<u>Rig</u> Rig#1	Wells Well #1	Mar (gallons) 5,200 31,822	(gallons) 5,200 31,823
tarch 1 2 3	38,068 Rig #1 (gallens) 1,590 800	50,672 Filg #2 (gallons)	45,815 Rig #3 (gallons)	Rig #4	51,480 Rig #5 (qallons)	Rig #6 (galions) 781 1,587 2,498	Fig#1	Well #1	(gallons) 5,200	(gallons) 5,200 31,823
tarch 1 2 3 4 5	38,068 Rig #1 (gations) 1,500 800 900 1,200 800	50,672 Filg #2 (gallons)	45,815 Rig #3 (gallons)	Rig #4 (gallons) (1994 (1994 (1994	51,480 Rig #5 (galfons)	Fög #6 (galions) 781 1,587 2,498 886 1,303		Well #1 Well #3	fgallons) 5,200 31,822 10,656	fgallons' 5,200 31,821 37,023
farch 1 2 3 4 5 6 7	38,068 Rig #1 (gatlens) 1,500 800 1,200 800	50,672 Rig #2 (gallons) 1,640 2,640 2,640 1,548 1,558	45,815 Rig #3 (gallons) 191 191 191 191 191 191 191 191 191 1	Rig #4 (ctallons)	51,480 Rig #5 (callons) (340 (350 (360 (360 (350 (360 (360 (360 (360 (360 (360 (360 (36	Rig #6 (gallens) 781 1.587 2.498 886 1.303 1.945 1.591	Rig#1 Rig#2	Weil #1 Weil #3 Weil #5	fgallons) 5,200 31,822 10,656 38,856	
farch 1 2 3 4 5 6 7 7 8 9	38,068 Rig #1 (gatlens) 1,500 800 1,200 800 500 396	Fig #2 (qallons) 1 27 1 40 1 50 1 50 1 50 1 50 1 50 1 50 1 123	Rig #3 (callons)	Rig #4 (gallons) 1406 1406 1406 1406 1406 1406 1406 1406	51,480 Rig #5 {callons} 046 1,20 1,20 1,20 1,20 1,20 1,20 1,00 1,00	Rig #6 (galliens) 781 1,587 2,498 886 1,303 1,945 1,591 1,977 2,152	Fig#1	Well #5 Well #6	fgallons) 5,200 31,822 10,656 38,856	(qallons) 5,200 31,622 37,023 10,656 38,856 49,512
farch 1 2 3 4 5 6 7	38,068 Rig #1 (gatlens) 1,500 800 1,200 800 500 396	Rig #2 (gallons) 1,848 1,848 1,848 1,848 1,848 1,848 1,848 1,848 1,243 1,233 1,232	Rig #3 (gallons) 1349 1349 1349 1349 1349 1349 1349 1349	Rig #4 (gallons) - 194 - 194 - 194 - 194 - 194 - 194 - 194 - 196 - 196 - 196	51,480 Rig #5 {qallons} 100 100 100 100 100 100 100 100 1000 1000 1000 1000 1000 1000 1000 1000 1000 1000 1000 1000 1000 1000	Rig #6 (gallens) 781 1,587 2,498 888 1,303 1,945 1,591 1,977	Rig#1 Rig#2	Well #1 Well #3 Well #5 Well #6 Well #8	5,200 31,822 10,656 38,856 - 22,447 25,588	(qallons) 5,200 31,822 37,023 10,654 38,856 49,512
larch 1 2 3 4 6 6 7 8 9 10 11 12	38,068 Rig #1 (gatlens) 1,500 800 1,200 800 500 396	50,672 Rig #2 (gallons) 1,97 1,44 1,64 1,64 1,64 1,233 1,232 1,849 1,643	Rig #3 (gallons) (gallons) 1,85 1,50 1,50 1,50 1,50 1,50 1,50 1,50	Rig #4 (qailons) 1994 1995 1996 1996 1996 1996 1996 1996 1996	51,480 Rig #5 {qalfons} 1,646 -1,550 -1,640 -1,640 -1,640 -2,070 -1,640	Ng #6 (gallens) 781 1.587 2.498 838 1.303 1.945 1.591 1.977 2.152 1.733 1.783	Rig#1 Rig#2	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8	5,200 31,822 10,656 38,856 22,447 25,588	fgaltons' 5,200 31,822 37,022 10,656 38,856 49,512 22,444 26,588
1 2 3 4 5 6 7 8 9 10 11 12 13 14	38,068 Rig #1 (gatlens) 1,500 800 1,200 800 500 396	80,672 Rig #2 (gallons) 1848 1848 1848 1849 1841 1841 1842 1821 1821 1843 1843 1844 184	45,815 Rig #3 (gallons) 1,11 1,23 1,24 1,24 1,25 1,26 1,27 1,26 1,26 1,26 1,26 1,26 1,26 1,26 1,26	Rig #4 (qallons) 1996 1996 1996 1996 1996 1996 1996 199	51,480 Rig #5 {qalions} 1,540 1,750 1,740 1,750 1,740 1,760 460 690 1,610 2,070 1,640 1,840 1,780	Rig #6 (gallens) 781 1.587 2.498 888 1.303 1.945 1.591 1.977 2.152 1.733 1.783 1.594 1.985	Rig#1 Rig#2 Rig#3	Well #3 Well #5 Well #6 Well #8 Well #8	5,200 31,822 10,656 38,856 22,447 25,588	(gallons 5,200 31,821 37,022 10,655 38,856 49,512 22,444 25,588 48,033 7,400 10,277
larch 1 2 3 4 5 6 7 8 9 10 11 12 13 14 16 16	38,068 Rig #1 (gatlons) 1,500 900 1,200 300 300 1,200 1,200 300 300 300 300 300 300 300	90,672 Rig #2 (gallons) 197 848	45,815 Rig #3 (gallons) 5,448 1,339 1,243	Rig #4 (gallons) - 194 - 199 -	51,480 Rig #5 (gallons) 1048 1050 1050 1050 1050 1050 1050 1050 105	Fig #6 (gallons) 781 1.567 2.499 809 1.303 1.045 1.597 2.152 1.773 1.565 1.685 1.685 1.685 1.990	Rig#1 Rig#2 Rig#3	Well #12 Well #12 Well #15 Well #8 Well #8 Well #8	5,200 31,822 10,656 38,856 22,447 25,588 37,400 10,270	(gallous) 5,20 31,62 37,02 10,659 38,659 49,57 22,44 25,68 48,03 37,40 10,27 47,67
larch 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 17 18	38,068 Rig #1 (astlons) 1,500 900 1,200 800 1,2	80,672 Rig #2 (gallons) 1846 203 1846 1848 1848 1848 1849 1,232 1,649 1,643 1,644 1,045 1,04	45,815 Rig #3 (gallons) 1 516 1596 1596 1596 1596 1596 1596 1596	Rig #4 (gallons) - 194 - 199 -	51,480 Rig #5 (gallons) (549 1750 1800 1800 1800 1800 1800 1800 1800 18	Rig #6 (graliens) 781 1.587 2.499 889 1.303 1.945 1.591 1.591 1.977 1.793 1.985 1.995 1.995 1.995 1.995 1.995 1.995 1.995 1.996	Rig#1 Rig#2 Rig#3 Rig#4	Well #1 Well #3 Well #5 Well #6 Well #6 Well #8 Well #8 Well #9 Well #9 Well #9	5,200 31,822 10,656 38,856 22,447 25,568 37,400 10,270	[gallons] 5,20 31,92 37,02 10,65 38,95 49,57 22,44 25,58 48,03 37,40 10,27 47,67
tarch 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 16 16	38,068 Rig #1 [gallon5] 11,500 800 900 900 12,200 800 13,200 800 13,200 800 13,200 800 13,200 800 800 800 800 800 800 800 800 800	80,672 Rig #2 (gallons) 1,97 1,948 1,848 821 1,233 1,232 1,643 1,849 1,643 1,849 1,643 1,644 1,644 1,644	45,815 Rig #3 (gallons) 1,385 1,305 1,305 1,305 1,305 1,305 1,305 1,305 1,305 1,305 1,250 1,250 1,250 1,250 1,250 1,250	Rig #4 (gallons) - 194 - 199 -	51,480 Rig \$5 fqalfons) 1606 180 180 180 180 180 180 180 180 180 180	Rig #6 (galions) 791 1.587 2.490 885 1.303 1.945 1.597 2.152 1.733 1.783 1.783 1.695 1.695 1.695 1.695 1.695 1.695	Rig#1 Rig#2 Rig#3 Rig#4	Well #1 Well #3 Well #5 Well #6 Well #6 Well #9 Well #11 Well #12 Well #14 Well #15	10,656 38,856 22,447 25,588 37,400 10,270	[gallons] 5,20 31,92 37,02 10,65 38,95 49,57 22,44 25,58 48,03 37,40 10,27 47,67
tarch 1 2 3 4 5 6 7 8 9 10 11 12 13 14 15 15 15 19 20 21	38,068 Rig #1 [gallon5] 11,500 800 900 900 12,200 800 13,200 800 13,200 800 13,200 800 13,200 800 800 800 800 800 800 800 800 800	80,672 Rig #2 (qatlens) 1,37 448 200 1,848 1,848 1,233 1,232 1,643 1,644 1,643 1,644 1,645 1	45,815 Rig #3 (gallons) 181 193 194 194 195 195 195 195 195 195 195 195 195 195	Rig #4 (gallons) - 194 - 199 -	51,480 Rig \$5	Rig 66 (gallons) 781 1,587 2,490 890 1,300 1,905 1,597 2,152 1,733 1,783 1,783 1,695 1,695 1,695 1,695 1,695 1,695 1,990 2,364 1,875 1,990 2,364 1,875 1,990 1,900	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #6 Well #6 Well #6 Well #8 Well #9 Well #11 Well #12 Well #14 Well #15	(railons) 5,200 31,622 10,656 38,856 22,447 25,598 37,400 10,270	[gallons] 5,20 31,82 37,02 10,65 39,654 49,51 22,44 25,58 48,03 37,40 10,27 47,67 10,73
tarch 1 2 3 4 5 6 7 8 9 10 11 12 13 14 16 16 17 18 19 20 21 22 23	38,068 Rig #1 [gallons] 1,500 800 1,200 800 1,200 800 1,200 1,200 800 1,200	80,672 Rig #2 (gallens) 1848 1848 1849 1849 1,232 1,243 1,849 1,643 1,643 1,643 1,643 1,643 1,1849 1,1	45,815 Rig #3 (gallons) 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,545 1,541 1,541 1,542 1,761 1,168 1,581	Rig #4 (gallons) - 194 - 199 -	51,480 Rig #5 {qallons} 1,550 1,670 1,670 1,670 2,070 1,640	Rig #6 (gallons) 781 1.587 2.490 880 1.303 1.945 1.597 2.152 1.733 1.783 1.783 1.783 1.895 1.995 1.995 1.995 1.995 1.995 1.995 1.996 1.996 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.997 1.996 1.996 1.997 1.996 1.996 1.996 1.996	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #6 Well #9 Well #11 Well #12 Well #14 Well #15	10,656 38,856 22,447 25,588 37,400 10,270	[gallons] 5,20 31,82 37,02 10,65 39,854 49,51 22,44 25,684 48,03 37,40 10,27 47,67 10,73 41,10 51,93 38,73 4,11
4arch 1 2 3 4 4 5 6 6 7 8 9 10 11 1 13 14 15 6 17 18 19 20 1 22 3 24 22 5	38,068 Rig #1 [gallons] 1,500 800 1,200 800 1,200 800 1,200 1,200 800 1,200	80,672 Rig #2 (gallens) 1846 1848 1848 1848 1848 1848 1848 184	45,815 Rig #3 (gallons) 1,14 1,14 1,14 1,14 1,14 1,14 1,14 1,1	Rig #4 (gallons)	51,480 Rig #5 {qallons} 1,556 1,876 1,876 1,840 1,84	Rig 66 (gallens)	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8 Well #12 Well #12 Well #14 Well #15 Well #15 Well #15	(gallons) 5,200 31,622 10,656 38,856 22,447 25,568 37,400 10,270 10,730 41,160	[gallons] 5,20 31,82 37,02 10,65 39,854 49,51 22,44 25,684 48,03 37,40 10,27 47,67 10,73 41,10 51,93 38,73 4,11
farch 1 2 3 4 4 5 6 6 7 8 9 10 11 2 13 14 15 6 17 18 19 20 1 22 3 24 5 25 27	38,068 Rig #1 (gatlens) 1,500 500 1,200 3,000 500 1,200 3,000 1,000	80,672 Rig #2 (gallens) 1346 1375 1348 1375 1375 1375 1375 1375 1375 1375 1375	45,815 Rig #3 (gallons) 1,11 1,10 1,10 1,10 1,10 1,10 1,10 1,1	Rigg#4 (gallons) 1002 1003 1004 100	51,480 Rig #5 {qallons} 75,55 \$4,70 \$1,184 \$1,680 \$460 \$6,60 \$1,640 \$1	Rig 66 (gallens) 781 1.587 2.480 888 1.303 1.945 1.597 1.977 2.152 1.733 1.783 1.783 1.783 1.783 1.783 1.783 1.783 1.783 1.785 1.950	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8 Well #12 Well #12 Well #14 Well #15 Well #15 Well #15	(gallons) 5,200 31,622 10,656 38,856 22,447 25,568 37,400 10,270 10,730 41,160	[gallons] 5,200 31,822 37,022 10,656 39,654 49,517 22,444 48,033 37,040 10,272 47,676 41,166 51,698
larch 1 2 3 4 4 5 6 6 7 8 9 10 11 2 13 14 15 6 17 18 19 20 21 1 22 3 24 5 25 27 28 29	38,068 Rig #1 (gatlons) 1,500 800 900 1,200 800 1,200 800 1,100 1	80,672 Rig #2 (gallens) 1446 2054 1,232 1,232 1,243 1,232 1,645 2,054 1,643 1,643 1,643 1,643 1,643 1,644 2,054 1,643	45,815 Rig #3 (gallons) 1.34 1.35 1.49 1.49 1.40 1.23 1.60 1.70 1.50 1.50 1.70 1.591 1.592 1.701 1.188 1.587 1.572 1.705 1.1582 1.580 1.1582 1.580 1.1582	Rigg#4 (gallons) 1003 1003 1004 1004 1004 1004 1004 100	51,480 Rig #5 {qallons} 1,55 1,78 1,78 1,78 1,78 1,78 1,680 1,680 2,070 1,610 1,840 1,560 2,070 1,670 1,870 1,670 2,070 1,87	Rig 66 (gailons) 781 1,587 2,490 888 1,303 1,945 1,591 1,597 2,159 1,733 1,783 1,785 1,594 1,955 1,685	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8 Well #12 Well #12 Well #14 Well #15 Well #15 Well #15	(gallons) 5,200 31,622 10,656 38,856 22,447 25,568 37,400 10,270 10,730 41,160	[gallons] 5,20 31,82 37,02 10,65 39,854 49,51 22,44 25,684 48,03 37,40 10,27 47,67 10,73 41,10 51,93 38,73 4,11
tarch 1 2 3 4 5 6 7 8 9 10 111 112 133 14 14 14 14 14 14 14 14 14 14 14 14 14	38,068 Rig #1 (gatlons) 1,500 800 900 1,200 800 1,200 800 1,100 1	80,672 Rig #2 (gatlens) 821 1,233 1,232 1,849 1,643 1,849 2,054 1,643 1,643 1,643 2,054 2,054 2,054 2,054 1,1438 1,1	45,815 Rig #3 (gallons) 11 12 12 13 15 15 15 15 15 15 15 15 15 15 15 15 15	Rig #4 (gallons) 1 000	51,480 Rig #5 (qallons) (6) 1,080 460 590 1,610	Rig 66 (gallens) 781 1.587 2.480 888 1.303 1.945 1.597 1.977 2.152 1.733 1.783 1.783 1.783 1.783 1.783 1.783 1.783 1.783 1.785 1.950	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8 Well #12 Well #12 Well #14 Well #15 Well #15 Well #15	(gallons) 5,200 31,622 10,656 38,856 22,447 25,568 37,400 10,270 10,730 41,160	[gallons] 5,20 31,82 37,02 10,65 39,854 49,51 22,44 25,684 48,03 37,40 10,27 47,67 10,73 41,10 51,93 38,73 4,11
arch 1 2 3 4 5 6 7 8 9 9 10 11 12 13 14 15 16 16 16 17 18 19 20 1 22 23 24 25 25 27 28 29 30	38,068 Rig #1 (gatlons) 1,500 800 900 1,200 800 1,200 800 1,100 1	80,672 Rig #2 (gatlens) 848 821 1,233 1,232 1,849 1,643 1,849 2,054 1,643 1,849 2,054 1,643 1,849 2,054 1,643 1,849 2,054 1,443 1,849 2,054 1,443 1,849 2,054 1,443 1,849 2,054 1,443 1,849 2,054 1,443 1,849 2,054 1,443 1,849 2,054 1,232	45,815 Rig #3 (gallons) 13 (gallons) 13 (gallons) 15 (5) (5) (5) (5) (5) (5) (5) (5) (5) (6) (7) (7) (7) (7) (7) (7) (7) (7) (7) (7	Rig #4 (callons) 1004 1004 1004 1004 1004 1004 1004 10	51,480 Rig #5 (qallons) (46) 1,080 460 590 1,610 1,840 1,780 1,610 1,840 1,780 2,070 2,070 2,070 2,070 1,870 2,070 2,070 1,870 2,070 1,870 2,070 1,870	Rig 66 (gallens) 781 1.587 2.490 888 1.303 1.945 1.591 1.977 2.152 1.733 1.783 1.783 1.783 1.783 1.783 1.785 1.950	Rig #1 Rig #2 Rig #3 Rig #4 Rig #5	Well #1 Well #3 Well #5 Well #6 Well #8 Well #8 Well #12 Well #12 Well #14 Well #15 Well #15 Well #15	(gallons) 5,200 31,622 10,656 38,856 22,447 25,568 37,400 10,270 10,730 41,160	[gallons] 5,20 31,62 37,02 10,65 38,85 49,51 22,44 25,68 48,03 37,40 10,27 47,67 10,73 41,18

Drill Rig Emissions - 2009 Natural Gas Consumption (Sample data entires provided below for January through December 2009)

			Rig Natur		-					
	Rig#i (gallons)	Rig #2 (gallons)	Rig #3 (gallens)	Rig #4 (gallons)	Rig #5 (gallons)	Rig #8 (gailons)	Rig	Wells	Jan	Totats
anuary 1	1,600	1,850	1,572	1,800	2,070	1,755	Rig#I	Well#1	(gallons) 41,995	(gallons) 41,995
2	1,700 1,500	2,054 1,848	2,390 1,572	1,600 1,600	1,380 2,070	1,990 1,726		yvat az	-	41,995
4 5	1,500 1,600	1,221 1,848	1,889 1,753	1,440 1,800	1 380 2 300	1,274 1,345	Rig#2	Well #3	19,696 37,138	19,696 37,138
6	1,000 600	2,054 1,848	1,591 1,591	1,620 1,620	1,640 1,870	978		Well #5	-	56,834
8 9	1,000 1,200	2,054 811	1,462 1,809	1,400 1,620	1,840 1,610	1,794	Rig#3	Well #6	31,060 19,579	31,06 19,57
10 11	1,200	1,848	1,572	1,620	1,840	1 (5)		Well #8	19,375	
12	1,500 1,200	1,233 1,027	1,594 1,978	1,440 1,440	1,610 1,840	1961	Rig#4	Well #9	42,580	50,63 42,58
13 14	1,300 1,300	1,007	1,897 2,341	1,800 1,700	1,840	130		Well #11	8,620	8,62
15 16	1,122 1,496	301	1,992 1,580	1,440 1,800	134	1976	Rig #5	Weli #12	23,490	51,20 23,49
17 18	1,122 1,122	901	1,343 1,134	1,620 1,080	1,649 1,649	160		Well #14	33,510	33,510
19 20	855 1,496	1,000	776 767	2,340 1,860	1,810 2,970		Rig#6	Well #15	9,068	57,000 9,060
21 22	1,870 1,663	18.0	1,001 1,500	2,180 1,980	Section 1 444 Ann	1,760	143.74	Well #17	38,110	38,11
23	1 496	200		1,580	1000	1,797		WEI #18	-	
24 25	2,203 1,309	1881	1872	1,620 1,280	1.00	1,740				47,17
26 27	1,496 1,309	133	1594	900	200	950				
28 29	1,309 1,309	200	1 600 1 600	1490	1,000	769				
30 31	1,309 1,309		1 500	1,000	1,040	/69 /60				
ubtotat		(gallons) 56,834	(gallons) 50,639	(galions) 51,206	(gations) 57,000	(gallons) 47,178				
Saterya Galacian		esperantes a	verkeevaarises v	Service Control	erena kananan ka		a was the and a same as	owanasowic	estatus (Naista	tar energy or de Controlle
	Rig #1	Rig #2	Rig #3 (gallons)	Rig #4	Rig #5	Rig #6	Rig	Wells	Feb	Totals
ebruary 1	1,600	1,850	1,572	1,800	2,070	1,755	Rig#1	Well #1	(gallons) 38,068	(gallons 38,06
2	1,700	2,054	2,390	1,800	1,380	1,990	reg#t	Wal at	30,000	
3 4	1,500 1,500	1,848 1,221	1,572 1,889	1,800 1,440	2,070 1,380	1,726 1,274	Rig #2	Well #3	19,696	19,696
5 6	1,600 1,000	1,848 2,054	1,753 1,591	1,800 1,620	2,300 1,840	1,345 978		Well #5	30,976	30,976
7 8	600 1,000	1,848 2,054	1,591 1,462	1,620 1,400	1,870 1,840	1,704	Rig #3	Well #6	31,060	50,672 31,066
9 10	1,200 1,200	811 1,848	1,809 1,572	1,620 1,620	1,610 1,840	1,453 2,387	_	Well #8	14,755	14,756
11 12	1,500 1,200	1,233 1,027	1,594 1,978	1,440 1,440	1,610 1,840	1761	Füg#4	Well #9	42,580	45,815 42,586
13 14	1,300 1,300		1,897 2,341	1,800 1,700	1,840 1,010	100	10234	Wel #11	2,680	2,680
15	1,122		1,992	1,440	1010	1,090	D1 - #F		02.400	45,260
16 17	1,496 1,122	1940 1940 1940	1,580 1,343	1,800 1,620		1,876	Rig#5	Well #12	23,490 27,990	23,490 27,990
18 19	1,122 855	100	1,134	1,080 2,340	1040 1870	1,974		Well #14		51,480
20 21	1,496 1,870	2.280 2.648	(87 1501	1,860 2,180	100	1/300 1/400	Rig#6	Well #15	9,068 35,803	9,068 35,803
22 23	1,663 1,496		1000	1,980 1,580	100	1,404		Well #17	-	:
24 25	2,203 1,309		1,521	1,620 1,280		1740		BOUND CONTRACTOR		44,67
26 27	1,496 1,309	2.07	1,60	900	100	924				
28	1,309		1008	1,000	Telo	789				
ubtotal	38,068	· 50,672	(gallons) 45,815	45,260	51,480	44,871				
constants			3725354E012	56 C. 44				88.82/g/0101675	wymięta:	901000000000000000000000000000000000000
	Rig #1 (gallons)	Rig #2 (galions)	Rig #3 (gallons)	Rig #4 (gallons)	Rig #5 (gallons)	Rig #6 (gallons)	Rig	Wells	Mar	Totals
larch 1	1,500	1.02	1,000	72,100	1,840	781	Rig#1	Well #1	<u>(gallons)</u> 5,200	(gallons) 5,200
2 3	800 900		1.00	1,000	(694) (840)	1,587 2,498		77 m	31,822	31,822 37,022
4 5	1,200 800	1 846 4 846	1004	1000	1,840 1,850	886 1,303	Rig #2	Weft #3	10,658	10,656
6 7	500		100	1.00	1,060	1,945 1,591		Well#5	38,856	36,856 49,512
8	186	821 1,233		1,440	460 690	1,977 2,152	Rig #3	Well #6	22,447	22,447
10	1 (564) (44) 1 (164) 1 (164) 1 (164)	1,232	1,010	1,460 1,640 1,460	1,610	1,733		Well #8	25,588	25,588
11 12	1 150	1,849 1,643		1,410	2,070 1,840	1,783 1,594	Rig #4	Well #9	-	48,035
13 14	1500	1,849 1,232	4.000	100	1,840 1,780	1,956 1,685		Wet #11	37,400 10,270	37,400 10,270
15 16	1 560 1 122 1 685	1,648 2,054	1,250 1,860	150	1,810 1,610	1,959 1,990	Rig #5	Well #12		47,670
17 18	Maria Contract	1,643 1,848	1,176 1,591	1 400 1 000	1,840 1,560	2,364 1,878	-	Well #14	10,730 41,160	10,736 41,160
19 20	(384 (172	2,054 811	1,591 1,562	1.00	2,070 1,670	1,172 600	Rig#6	Weil #15		51,896
21 22	196. 192 1989	1,848 1,643	1,701 1,168	1,000 1,000 1,000	2,070 1,870	500 750	erik ser	West #17	38,736	38,730
23	1,045	2,054	1,587		1,560	950		Wat His	4,119	4,119
24 25	1,000	2,054 1,232	1,594 1,572	750	2,070 2,070	1,012 720				42,85
26 27	1000	800 1,438	1,705 1,158	1,260 1,980	1,970 1,380	650 620				
28	1,170	1,848 2,054	1,580 1,398	1,720 1,320	1,610 1,840	930 988				
29		2,540	1,974	1,620	1,610	993				
30		1,428	1,121	1,620	1,380	**********				
	37,022	1,428 49,512	1,121 48,035	47,670	1,380 (51,890	1,1935 42,855				

		·			1	Drilling	Drilling	·		Hours	Natural	Heat	Diesel	Heat	Diesel	Heat	T		Drill Ric	Emission	Factors	Ti	Eml	ssions f	from Dril	ling (St	ack Parame	cters
n (WGS	-	Well Name	Field Name	Well Sput	Formation	Start	End	Well Depth	Site Rating	Operated to	Gas Use	Content	Fuel Use	Content	Sulfur	input of	BSFC	NO _x	co	voc	PM ₁₀	нсно						emp Veloci	
Long	Elev	Ţ	(wante	1 0000	<u> </u>	Date	Date			Orill Well	per Well		per Well	Diesel Fuel Btu/gal	Content	Fuel	54.6.4.4.		1	r or (lb/M					per Well			F ft/sec	
9 70750	7 179	Stud Horse Butte 41	22 Jonah	12/16/07	Lance	2/3/08	2/14/08	11.751	hp or (MMBtu/hr) 1,476	288	mscf	8tu/scf 1,000	15.431	130,000 130,000 130,000	500	2,006	7,389	4.80	8.50	1.00	0.40	0.00	1.44 2.54	0.30	0.12 0	.00 0.05	16.40 63	0.55 98.4	0 0.6f
20000		- granakiyali diyasaya sagasadi	ya passinya	en Definition s	V ANALYSIAN			10-12-12-0-0	1,476	288	W. Doporation, pro-	1,000	15,431	130,000	500	2,006	7,389	4.80	8,50	1,00	0.40	0.00	1,44 2.54	0.30	0.12 0	00 0.05	16.40 63	0.55 98.40	0 0.66
	2000 C	1 11 11 13 13 13 13 14 14 14 15 15 15 15 15 15 15 15 15 15 15 15 15	ska (augusyenys	Calleggerenter og		25400	200000	11,679	(6.3) 1,476	144 264	311111111111111111	1,000	4,209 3,626																
9.70708	7.107	Stud Horse Butte 41	ZZ VORBIL	121301	Latitue	2/24/00	514591450	11,0/0	1,476	264	(844,871,778.)	1,000	3,628	130,000	500	472	6,782	4.80	8.50	1.00	0.40	0.00	0.37 0.65	80.0	0.03 :0	.00 0.01	16.40 63	0.55 98.40 4.00 17.50	0.60
erganis	myskina		Had aproxima	-:		ete epigené	Standarded	1921(1992)	:.eze::/(6.3)	123		1,000	1,052	130,000	500	137	6,200	(0,15)	(0.036)	(0.0022)	(0.015)	(0,00045)	0.01 0.00	0.00	0.00	00 0.00	13.00 34	4.001 17.50	0 1.28
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